RAM PUMP

MOHD SAZAMAR BIN MOHAMAD
(98554934)

A thesis submitted in partial fulfillment of the requirement for the award of Bachelor Engineering (Hons) (Mechanical)

Faculty of Mechanical Engineering
Universiti Teknologi MARA (UiTM)

APRIL 2003

" I declared that this thesis is the result of my own work except the ideas and summaries which I have clarified their sources. This thesis has not been accepted for any degree and not concurrently submitted in candidature of any degree."

Signed : .....

Date : 22/05/2003

Mohd Sazamar Bin Mohamad

UiTM No : 98554934

ABSTRACT

Hydraulic ram pumps are water-lifting devices that are powered by filling water. Such pumps work by using the energy of water falling a small height to lift a small part of that amount of water to a much greater height. In this way, water from a spring or stream in a valley can be pumped to a village or irrigation scheme on the hillside. The main and unique advantage of hydraulic ram pumps is that with a continuous flow of water, a hydram pump operates automatically and continuously with no other external energy source - be it electricity or hydrocarbon fuel. It uses a renewable energy source (stream of water) mid hence ensures low running cost. It imparts absolutely no harm to the environment Hydraulic ram pumps are simple, reliable and require minimal maintenance. All these advantages make hydraulic ram pumps suitable to rural community water supply mud backyard irrigation in developing countries

TABLE OF CONTENTS

CHAPTER II RAM PUMP: THE BASIC KNOWLEDGE

CHAPTER III DESIGN